What is claimed is:

1. A piezoelectric ceramic composition comprising a perovskite compound comprising Pb, Zr and Ti as main components, wherein said piezoelectric ceramic composition comprises Cr as an additive from 0.025 to 0.250 wt% in terms of Cr_2O_3.

2. A piezoelectric ceramic composition comprising a perovskite compound comprising Pb, Zr, Ti, Mn and Nb as main components, wherein:

said piezoelectric ceramic composition is represented by a formula, $Pb_\alpha[(Mn_{1/3}Nb_{2/3})_xTi_yZr_z]O_3$, where α, x, y and z fall within the ranges of $0.95 \le \alpha \le 1.02$, $0.02 \le x \le 0.15$, $0.48 \le y \le 0.62$, and $0.30 \le z \le 0.50$, respectively; and

said piezoelectric ceramic composition comprises Cr as an additive from 0.025 to 0.250 wt% in terms of Cr_2O_3.

3. The piezoelectric ceramic composition according to claim 1 or 2, wherein:

said piezoelectric composition comprises Cr as an additive from 0.030 to 0.200 wt% in terms of Cr_2O_3.

4. The piezoelectric ceramic composition according to claim 1 or 2, wherein:

Δk15 (here, Δk15 is the rate of change in electromechanical coupling factor k15, caused by external thermal shock) of said piezoelectric ceramic composition is 3.0% or less in absolute value.

99P06069 US-5336

5.   The piezoelectric ceramic composition according to claim 1 or 2, wherein:

    $\Delta k15$ (here, $\Delta k15$ is the rate of change in electromechanical coupling factor $k15$, caused by external thermal shock) of said piezoelectric ceramic composition is 2.5 % or less in absolute value.

6.   The piezoelectric ceramic composition according to claim 1 or 2, wherein:

    the Q_{max} value of said piezoelectric ceramic composition is 30 or more.

7.   The piezoelectric ceramic composition according to claim 1 or 2, wherein:

    the Q_{max} value of said piezoelectric ceramic composition is 50 or more.

8.   The piezoelectric ceramic composition according to claim 1 or 2, wherein:

    $\Delta F0$ (here, $\Delta F0$ is the rate of change in oscillation frequency $F0$, caused by external thermal shock), of said piezoelectric ceramic composition is 0.1% or less in absolute value.

9.   The piezoelectric ceramic composition according to claim 1 or 2, wherein:

    the Curie temperature Tc of said piezoelectric ceramic composition is 340°C or higher.

99P06069 US-5336

10. A piezoelectric element comprising:

a piezoelectric substrate having a front surface and a back surface opposed to each other with a predetermined distance between them, and

a pair of electrodes arranged on said front surface and said back surface of said piezoelectric substrate, respectively, wherein:

said piezoelectric substrate is constituted with a sintered body comprising a perovskite compound comprising Pb, Zr, Ti, Mn and Nb as main components;

said sintered body is represented by a formula, $Pb_\alpha[(Mn_{1/3}Nb_{2/3})_xTi_yZr_z]O_3$, where α, x, y and z fall within the ranges of $0.95 \leq \alpha \leq 1.02$, $0.02 \leq x \leq 0.15$, $0.48 \leq y \leq 0.62$, and $0.30 \leq z \leq 0.50$, respectively; and

the sintered body comprises Cr as an additive from 0.025 to 0.250 wt% in terms of Cr_2O_3.

11. The piezoelectric element according to claim 10, wherein:

$\Delta k15$ (here, $\Delta k15$ is the rate of change in electromechanical coupling factor k15, caused by external thermal shock), of said piezoelectric substrate is 3.0 % or less in absolute value.

12. The piezoelectric element according to claim 10, wherein:

the vibrational mode of said piezoelectric element is a thickness-shear mode.

13. The piezoelectric element according to claim 10, wherein:

99P06069 US-5336

said piezoelectric substrate is constituted with a
sintered body comprising Mn as an additive from 0.20 wt% or
less (not inclusive of 0) in terms of $MnCO_3$.

99P06069 US-5336